(b) sequences which hybridize to (a) or (b) under stringent hybridization conditions and encode a protein which exhibits the ability to form tendon/ligament-like tissue.

31. A host cell transformed with a DNA molecule according to claim 29.

32. A host cell transformed with the DNA molecule of claim 30.

33. An isolated DNA molecule having a sequence encoding a protein which is characterized by the ability to induce the formation of tendon/ligament-like tissue, said DNA molecule comprising a DNA sequence selected from the group consisting of:

(a) nucleotide #579 to #882 of SEQ ID NO: 1; and

(b) naturally occurring allelic sequences and equivalent degenerative codon sequences of (a).

34. A host cell transformed with the DNA molecule of claim 33.

35. A vector comprising a DNA molecule of claim 33 in operative association with an expression control sequence therefor.

36. A host cell transformed with the vector of claim 35.

37. A method for producing a purified V1-1 protein, said method comprising the steps of:

(a) culturing a host cell transformed with a DNA molecule according to claim 29; and

(b) recovering and purifying said V1-1 protein from the culture medium.

38. A method for producing a purified V1-1 protein said method comprising the steps

of:

(a) culturing a host cell transformed with a DNA molecule according to claim 30; and

(b) recovering and purifying said V1-1 protein from the culture medium.

39. A method for producing a purified V1-1 protein said method comprising the steps of:

(a) culturing a host cell transformed with a DNA molecule according to claim 33; and

(b) recovering and purifying said V1-1 protein from the culture medium.

40. A chimeric DNA molecule comprising a DNA sequence encoding a propeptide from a member of the BMP family of proteins linked in correct reading frame to the DNA sequence of claim 29.

41. A chimeric DNA molecule according to claim 40, wherein the propeptide is the propeptide from BMP-2.

REMARKS

Applicants have cancelled claims 1-13 and 22-23 and substituted claims 29-41 in order to more particularly describe and distinctly claim the invention. The new claims describe novel DNA molecules which encode a polypeptide demonstrated in the specification to induce the formation of tendon/ligament-like tissue. No new matter has been added to the claims. Accordingly, the amendment is proper and should be entered. For the reasons stated below, the newly submitted claims are not subject to the previous rejections, and should be allowed.